IN THE CLAIMS

1. **(currently amended)** A multiprocessor system comprising a common memory and a number of processors connected via a common bus, only one processor being allowed to access [[the]] same data area of said common memory at a time, wherein:

said common memory is provided with a number of data areas that store data and with a control information area that stores control information indicating whether each of the data areas is in use;

each processor is provided with a storage unit ~~equivalent to~~ for storing same data and same control information as those stored in the common memory and with an access controller; and

the access controller of a processor that does not have access privilege monitors data and addresses that flow on the common bus, accepts data written to said common memory and data read from said common memory and stores this data in the storage unit within its own processor.

2. (original) The system according to claim 1, wherein identical addresses are allocated to address spaces of the storage unit of each processor and of the common memory, and the access controller of a processor that does not have access privilege writes data on the common bus to a storage area of a storage unit designated by an address on the common bus.

3. (original) The system according to claim 1, wherein when access to a prescribed data area in said common memory is requested by a host apparatus, the access controller of each processor reads control information corresponding to this data area in said storage unit,

determines whether another processor is busy and, if another processor is busy, inputs result of

the determination to the host apparatus without accessing said common memory.

4. (original) The system according to claim 1, wherein if, when read-out of data from a

prescribed data area in said common memory is commanded by a host apparatus, said data area

in said storage unit is valid, then the access controller of a processor that has access privilege

reads data from this data area and inputs the data to the host apparatus.

5. (original) The system according to claim 2, wherein when writing of data to a

prescribed data area in said common memory is commanded by the host apparatus, the access

controller of a processor that has access privilege writes data to a data area of said storage unit

and sends this data as well as an address corresponding to this data area to the common bus.

6. (currently amended) A multiprocessor system comprising a common memory and a

number of processors connected via a common bus, only one processor being allowed to access

[[the]] same data area of said common memory at a time, wherein:

said common memory is provided with a number of data areas that store data and with a

control information area that stores control information indicating whether each of the data areas

is in use;

each processor is provided with a storage unit ~~equivalent to~~ for storing same control

information as that stored in said control information area and with an access controller; and

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the access controller of a processor that does not have access privilege monitors control

information and addresses that flow on the common bus, accepts this control information and

stores it in the storage unit within its own processor.

7. (original) The system according to claim 6, wherein identical addresses are allocated to

the storage unit of each processor and to a control information area of the common memory, and

the access controller of a processor that does not have access privilege accepts the control

information on the common bus and writes it to a storage area of a storage unit designated by an

address on the common bus.

8. (original) The system according to claim 6, wherein when access to a prescribed data

area in said common memory is requested by a host apparatus, the access controller of each

processor reads control information corresponding to this data area in said storage unit,

determines whether another processor is busy and, if another processor is busy, inputs result of

the determination to the host apparatus without accessing said common memory.

9. (currently amended) A multiprocessor system comprising a common memory and a

number of processors connected via a common bus, only one processor being allowed to access

[[the]] same data area of said common memory at a time, wherein:

said common memory is provided with a number of data areas that store data and with a

control information area that stores control information indicating whether each of the data areas

is in use;

each processor is provided with a storage unit ~~equivalent to~~ <u>for storing same data as that</u>

<u>stored in</u> said data area and with an access controller; and

the access controller of a processor that does not have access privilege monitors data and

addresses that flow on the common bus, accepts this data and stores it in the storage unit within

its own processor.